DOCUMENT RESUME

ED 043 681 TM 000 162

AUTHOR	Rice, Ernest Thomas
TITLE	An Exploratory Study to Investigate the Aspects of the Construction and Use of Instruments Encompassing the Evaluative Strategies of Context, Input, Process, and Product of In-Service Programs.
INSTITUTION	Iowa Univ., Iowa City. Iowa Center for Research in School Administration.
REPORT NO	RD-NO-51
PUB DATE	Apr 69
NOTE	4p.
EDRS PRICE	EDRS Price MF-$0.25 HC-$0.30
DESCRIPTORS	Administrative Personnel, Analysis of Variance, *Decision Making, Educational Change, Elementary School Teachers, Evaluation, *Inservice Programs, *Instructional Improvement, *Models, *Program Evaluation, Secondary School Teachers

ABSTRACT

This paper describes the construction and use of a set of evaluative instruments to aid in the planning of in-service programs. The four instruments constructed used Stufflebeam's four evaluative strategies: context, input, process, and product. They were designed to provide rating which could be compared in regard to personnel group and local school district variables. The instruments were administered to 410 teachers and 173 administrators in Iowa school districts. Differences in administrators' and teachers' perceptions in evaluating in-service programs was a major factor in the study. Superintendents rated all four concepts higher than principals and both groups rated all four higher than teachers. Older teachers gave higher ratings than younger teachers. Other differences are noted and interpretations suggested. (LR)

ED043681

THE IOWA CENTER FOR RESEARCH IN SCHOOL ADMINISTRATION

The University of Iowa — Iowa City, Iowa

Research Digest

Number 51

AN EXPLORATORY STUDY TO INVESTIGATE THE ASPECTS OF THE CONSTRUCTION AND USE OF INSTRUMENTS ENCOMPASSING THE EVALUATIVE STRATEGIES OF CONTEXT, INPUT, PROCESS, AND PRODUCT OF IN-SERVICE PROGRAMS

by

Ernest Thomas Rice

prepared for

IOWA CENTER FOR RESEARCH IN SCHOOL ADMINISTRATION

Dr. Franklin Stone, Director

U.S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE
OFFICE OF EDUCATION
THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL OFFICE OF EDUCATION POSITION OR POLICY.

The University of Iowa
Iowa City, Iowa
April, 1969

TM 000 162

46

AN EXPLORATORY STUDY TO INVESTIGATE THE ASPECTS OF THE CONSTRUCTION AND USE OF INSTRUMENTS ENCOMPASSING THE EVALUATIVE STRATEGIES OF CONTEXT, INPUT, PROCESS, AND PRODUCT OF IN-SERVICE PROGRAMS

Ernest Thomas Rice

Introduction

From his study of the literature on education, Mr. Rice observed that one of the greatest problems facing education today is that of keeping teachers abreast of changing conditions. In order for the schools to assist their teachers to meet the pressures of change and to improve instruction in-service education is essential. Related to the improvement of instruction is the necessity for good evaluation procedures.

Problem

The problem of this study was to construct a set of evaluative instruments that would be of better use to the decision-maker in planning in-service programs than the instruments now in common use.

The problem focused on the following considerations:

1. To construct a set of evaluative instruments, encompassing evaluative strategies of a decision-making model, for the purpose of measuring certain categorized elements of in-service problems. The model which was used was that of Daniel Stufflebeam.

2. To obtain ratings from a sample and view them in relation to:
   a. The variables of context, input, process and product
   b. The variables associated with classes of personnel:
      Administrative personnel vs. teacher personnel;
      elementary personnel vs. secondary personnel;
      older vs. younger teachers; teachers with four
      years of college training or less vs. teachers with
      five or more years of college training.
   c. The variables associated with local school district: size of enrollment, assessed value per pupil average number of years that teachers have remained in the district.

The general purpose of the investigations was to study the characteristics of the instruments which were constructed by the author and to make suggestions for their future use and modification.

A more specific purpose of the study was to make suggestions that could be helpful to those interested in improving an in-service program. A question which was particularly

important for this study was, "How do the perceptions of administrators compare to the perceptions of teachers in the evaluation of various aspects of the in-service program?"

In reviewing the literature on the subject of evaluation, the author concluded that recent efforts of evaluation appear to be moving away from external evaluation of teacher traits and school activities and toward giving more emphasis to self-evaluation of the parts of the school program and the situation in which these parts exist. What is being evaluated and for what purpose the evaluation is being made must be carefully spelled out before an evaluation is undertaken.

In general the review of the literature centered around the most critical needs for professional growth, criteria for evaluating in-service programs, the methods used by researchers to evaluate in-service programs, and the needs of decisions-makers in an atmosphere of change.

Methods

Four instruments were constructed. Each one related to one of the four evaluative strategies proposed by Stufflebeam, that is the context, input, process, and product of evaluation. The major objective of context evaluation was to define the environment's unmet needs, and the problems underlying those needs. Input evaluation was to provide information for deciding whether outside assistance was to be sought for meeting goals and objectives, and what strategies were to be employed to reach the proposed goals. Process evaluation sought to predict or detect, during the implementation stages, defects in the procedural design. Product evaluation was used to determine the effectiveness of the project after it had completed its cycle, or, in other words, to measure and interpret the outcomes.

The four instruments were used in a survey of the sixty school districts in Area IX and Area X in East Central Iowa. The sample consisted of 173 administrative personnel and 410 teachers. A three-factor Lindquist Type III analysis of variance design was used among other types of statistical tests.

Findings

On the basis of the instrument used, the writer found that there existed some difference between the administrative personnel and the teachers concerning the concepts involved. There was, however, no significant difference between the results of the four types of districts studied. Superintendents rated all four concepts significantly higher than principals, and both administrative groups rated all four concepts (context, process, input and product) higher than teachers. Elementary and secondary teachers rated all four concepts the same. Older teachers gave higher ratings on the four concepts than younger teachers.

Conclusions

Of the four concepts there was less discrepancy indicated in the ratings between administrators and teachers on context and more discrepancy indicated on input, process and product. Although it was difficult to infer which of the four strategies administrators or teachers are best able to evaluate , there appeared to be considerable value in comparing discrepancies between administrators and teachers on the four strategies as a diagnostic measure in order to plan cooperative activities between teachers and administrators. Some probable benefits resulting from this approach would be the development of a common philosophy toward in-service education and better participation in shared decision-making in order to agree upon objectives and better means of ensuring effective in-service activities.

It was found in this study that there was a significant difference among the four concepts as rated by teachers. There was also a significant difference between the concepts as rated by administrators on the four instruments. Context was rated significantly higher than input, process, and product by both teachers and administrators. Product was rated significantly higher than input and process by teachers only. This tends to infer that administrators feel that the district provides a climate, environment and cooperation that is capable of providing a better in-service program than is indicated by the aspects of organization, implementation, and achievement of objectives, if the instruments are measuring what they were intended to measure. It could also be interpreted that teachers feel the same way, except that they rate product higher in relation to the other three concepts than administrators do. This would appear to indicate that teachers have more confidence in the outcomes of their in-service programs in relation to the environment, organization and implementation than administrators do.

The fact that no significant difference was found between the four different districts used in this study may be due to the confounding of size of enrollment with wealth. Although it could be suggested that teachers would be more content with their in-service programs in districts that retained their teachers longer, this was not born out by this study. The fact that older teachers rated their programs significantly higher than younger teachers may be due to cognitive dissonance. Although one previous study found out that teachers with a Bachelor's degree rated their programs higher than teachers with five or more years of college, no significant difference was indicated in this study. Elementary and secondary teachers appeared to rate their in-service programs the same.

The author concludes that there appears to be value in using such instruments again after revisions are made and carried out in order to analyze changes in ratings given to items indicating weaknesses and to indicate whether administrators and teachers are more in agreement on their ratings. Less discrepancy would show improvement in the accuracy of perceptions between levels of personnel.

Norms were developed for teacher and administrators on all four strategies. These could be used to determine whether there was a "normal" discrepancy between teachers and administrators in a district and to infer how the district rated in relation to other districts in the sample on each of the four strategies.